SFM Wildland-Urban Interface Building Standards Advisory Committee

Meeting Notes Advisory Committee Meeting July 8, 2005, 9 a.m. to 4 p.m.

Office of the State Fire Marshal Headquarters 1131 S Street, Conference Room Sacramento. CA 95814

FACILITATORS:

Kate Dargan and Ethan Foote, Co-Chairs

SFM Wildland-Urban Interface (WUI) Building Standards Advisory Committee

COMMITTEE MEMBERS PRESENT:

Lee Braun Joe Garcia

Pete Guisasola (afternoon session only)

John Hofmann Tonya L. Hoover

Don Oaks Steve Quarles Bob Raymer Kevin Reinertson

Brad Remp Howard Stacy

Hugh Council, SFM Liaison

STAKEHOLDERS IN AUDIENCE:

Denise Duncan, Mattos & Associates Lumber Association of CA & NV (LACN), & Trex Tom Garrett, Product Certification Consultants Bill Hendricks, Safer Building Solutions, Chemco Charles Jourdain, CA Redwood Association Kathy Lynch, Lynch & Associates,

AFPA & Chemco

Deborah Mattos, Mattos & Associates

LACN & Trex

James McMullen, The McMullen Co., Inc./Hoover

Treated Wood Products, Inc. Joseph Pass, TimerTech Ltd.

Mark Pawlicki, Simpson Timber Company and

CA Forestry Association Kevin Turner, TimberTech Ltd.

David Tyree, American Forest & Paper Assoc.

Bob Viterbo, AmeriDeck

Joe Zicherman, Fire Cause Analysis, for Trex Co.

DOCUMENT HANDOUTS:

Meeting Notes taken from Stakeholders' Meeting held June 30, 2005,

WUI Building Standards Informational Brochure, "Protecting the Homes and Citizens of California" "SFM WUI Building Standards Advisory Committee 07 July DRAFT Recommendation for 'Phase II' regulation changes to CBC Chapter 7A"

"1997 Uniform Building Code Standard 8-1, Test Method for Surface-Burning Characteristics of Building Materials"

Excerpts from "Health and Safety Code Section 18930"

Excerpts from "2001 California Building Code, Section 207 – F and 208 – G"

Written comments to Ethan Foote dated October 6, 2004, entitled "Building Construction Strategies for Interface Fire Hazard Mitigation"

Written proposed language by Howard Hopper, UL, dated 07/07/05

Written questions regarding Phase I and Phase II

TODAY'S AGENDA

Co-Chair Dargan presented today's agenda:

- 1. Previous meeting (6/30/05) summary
- 2. CALBO WUIBS training class overview
- 3. Text work
- 4. Adoption strategy
- 5. Need for July 28th combined meeting

COMMENTS/DISCUSSIONS

Co-Chairs Dargan and Foote explained that the "SFM WUI Building Standards Advisory Committee 07 July DRAFT Recommendation for 'Phase II' regulation changes to CBC Chapter 7A" distributed at today's meeting represents the revisions made during the June 30, 2005 Stakeholder Meeting with further input from the Core Committee. It was necessary to reformat the proposed text from the June 30th revisions to conform the numbering of the document. The underlined text in the July 7th Draft is proposed additions; the text that is not underlined is existing in Chapter 7A; the strikethrough portions are proposed for deletion. Highlighted sections reflect action items from the June 30th meeting; **bold** and **bold/strikethrough** text represents revisions since the June 30th meeting. The goal for today is to develop the Final Draft Committee recommendation to the State Fire Marshal (SFM).

WUIBS Training Class Overview: Co-Chair Dargan offered for review during today's meeting a Draft copy of the WUI Building Standards class that is under development. She explained that Cliff Hunter, a Fire Marshal and Building Official in the San Diego Area has been developing this 8-hour class to train industry, contractors and building officials, etc. on the proposed regulations. He has included a PowerPoint presentation on structural survivability, fire behavior and instructor/student guide for builders and inspectors. Some of the grant money that was available until June 30, 2005 had been devoted to the development of a master curriculum. This curriculum is in its final development and will be presented to CTI by SFM.

The following matrix was developed for use during the meeting:

REQUIREMENTS FOR FIRE HAZARD SEVERITY ZONES (FHSZ)

				Projections/		Windows &	
FHSZ	Roof	Eaves	Gutters	Underfloors	Walls	Doors	Doors
SRA					Wall &		
Very High	X	X	X	X	12" Strip	X	X
LRA					Wall &		
Very High	X	X	X	X	12" Strip	X	X
SRA							
High	X	X	X	X	12" Strip		X
SRA							
Moderate	X	X		X	12" Strip		X
Other WUI							
Fire Areas,	X	X	X	X	X	X	X
per Locals							

Section 701A.3.2 Application Following Map Revisions:

- Member Bob Raymer cautioned that the timeline referred to may have to be revised, depending on the adoption strategy used. It was suggested that a specific date, possibly July 2008, be included. Hugh Council will consult with Dave Sapsis (FRAP) regarding the use of a specific date.
- Discussion was held as to the level of detail needed in the mapping project. Co-Chair Dargan added that there is a need for conversation to occur in regards to the mapping project because it is a foundation stone for this regulation. Once the Committee makes its final recommendations to the SFM, there will be a need to consider oversight of the process until implementation has occurred. The Committee felt it was important to have core principles of the map development before presentation to the BSC in September.
 - o It was suggested that Chiefs Ruben Grijalva and Jim Wright meet to discuss the criteria of the maps to be developed with input from FRAP and the Core Committee, in the development of a written goal statement for the Fire Hazard Severity Zone mapping project.
- It was recommended that a map and appropriate website address be included as it relates to State Responsibility Areas referenced under areas 1, 3 and 4 in Section 701A.3.2.

Ignition-Resistant Material:

- Howard Hopper had reworked this section with proposed language and is included in the July 7th Draft.
- Additional verbiage to the Note was suggested, to read: "Fire-Retardant-Treated Wood as defined in CBC Section 207 or shall satisfy the intent of the above definition...".

703A.2 Qualification by Testing:

■ Reference to National Evaluation Report (NER) was removed.

704A.3.2.1 Exterior Glazing:

■ With the exception of referencing ASTM E 2010, the two paragraphs were similar. It was suggested that the second paragraph be deleted. Member Raymer asked that Grant Muller be consulted as to his recommendations with the language, as proposed, and with the deletion of the second paragraph.

704A.3.2.2 Doors:

■ Under the Exception, "Noncombustible or exterior F.R. treated wood vehicle access doors", it was asked if the common aluminum/steel doors that are panelized with backing of aluminum and/or steel material with composite wood products in the front portion would no longer be allowed. Co-Chair Dargan responded that the intent was that metal garage doors would be excluded. There was concern expressed that a steel door with plastic insulation on the back side might be an issue. Suggested language: "noncombustible exterior surface"; or "exposed side of the door". Member John Hofmann added that, for consistency, every time "ignition-resistant" has been used in the proposed language, "or noncombustible" has been added; therefore "or fire-retardant" could be added to be as restrictive as possible. Member Don Oaks added that, based

on discussion at the previous meeting, it was questionable whether the inclusion of "exterior" was necessary and, technically, was covered by the addition of the UBC definition.

704A.4 Decking, Floors and Underfloor Protection:

■ It was suggested that the inclusion of decking, floors, and underfloor protection under one section might be confusing and, for clarification, decks should be separated from floors and underfloors, i.e., "704.5 Decking". Therefore, **704A.4** would, instead be entitled, "Floor Projections and Underfloor Protection".

704A.4.1 Appendages and Floor Projections:

- In referencing the scope on page 3 of the July 7th Draft, Item 3, "State Responsibility Area High Fire Hazard Severity Zones all provisions within this chapter except exterior walls", Item 3 is a trade-off; decks have to meet the standard. The walls can be untouched but the deck has to meet the standard. If Item 3 of this standard is used, the wall has to be treated. There is awkwardness in this standard that needs to be addressed; the walls don't need to be treated, but the decks always need to meet this standard.
- As currently proposed, this section suggested that in a High Fire Hazard Severity Zone, as opposed to a Very High Fire Hazard Severity Zone, nothing would be required, because in High Fire Hazard Severity Zone, the wall requirements don't apply. Suggestion was made that instead of referencing exterior walls, reference should be to eaves, i.e., "...shall maintain the ignition-resistant integrity of exterior walls as required under eaves, or the projection shall be enclosed to the grade."

704A.4.2 Unenclosed Underfloor Protection:

- Member Kevin Reinertson noted a correction should be made "...in accordance with Section 705A.1 704A.3".
- The unaddressed issue in 704A.4.1, as stated above, also applies to this section. Co-Chair Foote added that by changing the definition of ignition-resistant material away from pressure-impregnated process to allow other materials, this has allowed for wood to be treated by a "spray on" and this issue needs to be reviewed.
- It was suggested that, referring to the scope, sometimes exterior walls don't require any protection; in all cases it is the intent to have some level of protection. The only zone that requires exterior wall protection is in Very High Fire Hazard Severity Zones. As currently proposed, in situations of underfloor areas tying into exterior walls, there will be underfloor-exposed areas in High Fire Hazard Severity Zones that will need no protection. It was suggested that this section of appendages and underfloors should be treated as eaves. It was suggested that under "Exception", the omission of "as required" might clarify. Through discussion, the Committee was looking for the simplest way to have the underfloor provide the same degree of protection that the walls in a Very High Fire Hazard Severity Zone. Considering time restraint, further discussion on this issue was tabled.

704A.4.3 5.1 Exterior Decks, Porches and Balconies:

■ There was concern with the reference of "within 10 feet of primary structure". This issue had been tabled at a previous meeting. The question: Does this refer to the whole deck or within 10 feet of the structure. It was recalled that it was the intent to include a detached deck and deck within 10 feet of the structure. The charging statement is that all decks must be treated; the

conception is that any decks entirely located greater than 10 feet from the primary structure do not have to be treated. Through further discussion, it was recommended to read, "Walking surfaces, stair treads, risers, and landings of decks, porches, and balconies shall comply with one of the three following provisions. Exception: Decks entirely located greater than 10 feet from the primary structure..." (Further wordsmithing is necessary for clarification.)

- Under Item 3, a formatting change was made to reference Items "1, 2 and 3" as "a, b and c".
- Under Item 3a, for clarification of who certifies, it was noted that Public Resources Code 4291 states that "...Prior to constructing a new building or structure or rebuilding a building inside a Fire Hazard Severity Zone, the owner shall obtain a certification from the local building official that the dwelling or structure, as proposed to be built, complies with all applicable state and local building standards, including what is described in Subdivision B of Section 51189...". The intent of this section is to say that you can build a deck out of slightly flammable materials, but there needs to be a process for verifying that defensible space requirements are met as part of the final Certificate of Occupancy. After further discussion, for clarification, verbiage was added to read, "The property is certified as meeting the requirements of defensible space, and prior to building permit final approval...".
- It was noted that the intent of Item 3b is to allow slightly flammable decking products to be used. Hugh Council added that the concern is not so much about treating the whole exterior wall when a deck is attached to a structure, but rather, when wind-blown ash piles up next to the exterior wall. Item 3b addresses the portion of the wall to which the deck is attached and is of approved noncombustible construction (fire-resistant material) and only applies to High and Moderate Fire Hazard Severity Zones.

Through further discussion, the Committee was in consensus that protecting the wall to which the deck is attached with noncombustible construction that extends a minimum of 12 inches above the surface of the deck would help to protect the wall. Within the law, there is already a section requiring a 6-inch lift for noncombustible wherever there is a deck attachment.

Through discussion, the Committee concluded that drifting embers need to be addressed; therefore, a 12-inch strip could be required, regardless of what decking material is used. In the decking section, Parts A and B need to be met. If Parts A and B are met, then a 12-inch strip is needed; if only Part A is met, then compliance with defensible space and a 12-inch strip is needed in a Moderate or High Fire Hazard Severity Zone. Further wordsmithing of this section is necessary.

Heat Release: Member Howard Stacy explained that a test time has to be established to adapt to the Heat Release Rate portion of the 705 standard. Currently, the test is a 3-minute underflame burn that is assessed for 40 minutes. A time period for this test needs to be established. Ten minutes is used for an exterior wall test. This is a work in progress; there are two issues (1) how long is the test run, and (2) whether to include total heat release as part of the test.

TASKS (FOLLOW-UP)

- 1. **Bob Raymer**, along with Leslie Haberek, will contact Stan Nishimura (BSC) to determine if there are any questions or clarification needed with the Phase I proposed regulations.
- 2. **Hugh Council** will consult with **Dave Sapsis** regarding the use of a specific date (i.e., July 2008) to include in Section 701A.3.2 Application Following Map Revisions.
- 3. Recommendation of Chiefs Grijalva and Wright to discuss mapping criteria, with input from FRAP and Core Committee. Also, possible development of a written goal statement for the mapping project.
- 4. Grant Muller to be consulted as to his recommendations with proposed language of 704A.3.2.1 Exterior Glazing.
- 5. **SFM** to post any updated version of the proposed regulations revised during July 8th Advisory Committee meeting on the SFM website (http://osfm.fire.ca.gov/UWIBS.html) as soon as available.

NEXT MEETING

A combined Advisory Committee and Stakeholder Meeting is scheduled for Thursday, July 28, 2005, beginning at 9:00 a.m. at the Regional Council of Rural Counties, 801 12th Street, 2nd Floor Conference Room, Sacramento, California.